TITLE of the INVENTION

"Digital filtering methods and devices "

TEXT of the ABSTRACT

In order to transform an input digital signal (x_n) into one or more output digital signals (y_n) containing even-indexed samples (y_{2n}) and odd-indexed samples (y_{2i+n}) , this filtering method includes at least one iteration (506) which contains an operation of modifying even-indexed samples (y_{2n}) by a function (R) of weighted odd-indexed samples $(\alpha_{0,j}.y_{2n+m_j})$ and an operation of modifying odd-indexed samples (y_{2n+1}) by means of a function (R) of weighted even-indexed samples $(\beta_{0,j}.(y_{2n}-y_{2n+2}))$. The weighted samples are obtained by means of at least one weighting operation. At least one of the weighting operations is applied to the difference between two consecutive even-indexed samples.

Application to the processing of images.

Figure 5.